

CLAIMS

AA34

5 1. A method of transmitting an image (3) between a transmitter (2, 5, 6) and a receiver (7, 8), comprising the steps of:

- dividing the image (3) into at least two image regions (R1, R2, Rn);
- coding the image regions (R1, R2, Rn) into a coded symbol stream (21), said coding utilising a symbolic representation and having predetermined accuracy levels in said image regions; and
- compressing the coded symbol stream into a compressed bit stream (PS1, 27),

15 **characterised** in that the method includes the further steps of:

- generating (22) a definition (PS2) of an outer boundary line (S_i) of at least one of the image regions (R2, Rn);
- transmitting said definition (PS2) to the receiver (7);
- transmitting the compressed bit stream (PS1, 27) to the receiver (7, 8; and
- decoding (33, 34) in the receiver with the aid of said definition.

25 2. The method of claim 1, **characterised** in that two different of the image regions (R2, Rn) are coded to have said predetermined accuracy levels independently of each other.

30 3. A method of transmitting an image (3) between a transmitter (2, 5, 6) and a receiver (7, 8), comprising the steps of:

- dividing the image (3) into at least two image regions (R1, R2, Rn);
- coding the image regions (R1, R2, Rn) into a coded symbol stream (21), said coding utilising a symbolic representation and having predetermined accuracy levels in said image regions; and

- compressing the coded symbol stream into a compressed bit stream (PS1, 27),

characterised in that the method includes the further steps of:

- 5 - generating (22) a definition (PS2) of a mask (PS2) for at least one of the image regions (R2,Rn), two different of the image regions (R2,Rn) being encoded to have said predetermined accuracy levels independently of each other;
- transmitting said definition (PS2) to the receiver (7);
- 10 - transmitting the compressed bit stream (PS1, 27) to the receiver (7, 8; and
- decoding (33, 34) in the receiver with the aid of said definition.

15 4. The method of claim 1,2 or 3, **characterised** in that only predetermined parts of the compressed bit stream (PS1,27) are decoded.

20 5. The method of any of the claims 1, 2, 3 or 4, **characterised** by generating a topology description, defining the topological relationship between objects (O1, O2, O3, O4) and shapes (S1, S2, S3, S4) in the image.

25 6. The method of any of the claims 1, 2, 3 or 4, **characterised** by generating a shape description, defining the appearance of the closed boundary line (S_i) of an object (O1, O2, O3, O4) in the image.

30 7. The method of any of the claims 1, 2, 3 or 4, **characterised** by generating a segment description, defining which transform coefficients that belong to respective segment.

35 8. The method of claim 7, **characterised** by generating a subset description, defining which transform coefficients that belong to an independently decodable part of a segment.

9. The method of any of the claims 5, 6, 7 or 8, **characterised** by generating of a pointer, defining a position in the bit stream (27) for the respective one of the above mentioned descriptions.

10. An arrangement for transmitting an image (3), comprising:

- a transmitter (2, 5, 6) and a receiver (7, 8);
- means (4, 5) for dividing the image (3) into at least two image regions (R1, R2, Rn);
- a coding device (5) for coding the image regions (R1, R2, Rn) into a coded symbol stream, said coding device utilising a symbolic representation and having predetermined accuracy levels in said regions;
- a compressing device for compressing the coded symbol stream into a compressed bit stream (PS1, 27); and
- means in the transmitter (2, 5, 6) for transmitting said compressed bit stream (PS1, 27) to the receiver (7, 8),

characterised in that the arrangement also includes:

- means (5) for generating (22) a definition (PS2) of an outer boundary line (S_i) of at least one of the image regions (R2, Rn);
- means in the transmitter (2, 5, 6) for transmitting said definition (PS2) to the receiver (7, 8); and
- a decoder (8) in the receiver for decoding (34, 35) of the compressed bit stream (PS1, 27) with the aid of said definition (PS2).

11. The arrangement of claim 10, **characterised** in that the coding device is arranged to encode (24) two different of the image regions (R2, Rn) to have the predetermined accuracy levels independently of each other.

12. An arrangement for transmitting an image (3), comprising:

- a transmitter (2, 5, 6) and a receiver (7, 8);
- means (4, 5) for dividing the image (3) into at least two image regions (R1, R2, Rn);
- a coding device (5) for coding the image regions (R1, R2, Rn) into a coded symbol stream, said coding device utilising a symbolic representation and having predetermined accuracy levels in said regions;
- a compressing device for compressing the coded symbol stream into a compressed bit stream (PS1, 27); and
- means in the transmitter (2, 5, 6) for transmitting said compressed bit stream (PS1, 27) to the receiver (7, 8),

characterised in that the arrangement also includes:

- means (5) for generating (22) a definition (PS2) of a mask (PS2) for at least one of the image regions (R2, Rn), the coding device (5) being arranged to encode (24) two different of the image regions (R2, Rn) to have said predetermined accuracy levels independently of each other;
- means in the transmitter (2, 5, 6) for transmitting said definition (PS2) to the receiver (7, 8); and
- a decoder (8) in the receiver for decoding (34, 35) of the compressed bit stream (PS1, 27) with the aid of said definition (PS2).

13. The arrangement of claim 10, 11 or 12, **characterised** in that the decoder (8) is arranged to decode only predetermined parts of the compressed bit stream (PS1, 27).

14. The arrangement of claim 10, 11, 12 or 13, **characterised** in that the transmitter (2, 5, 6) has means for generating a topology description, defining the topological relationship between objects (O1, O2, O3, O4) and shapes (S1, S2, S3, S4) in the image.

15. The arrangement of claim 10, 11, 12 or 13, **characterised** in that the transmitter (2, 5, 6) has means for generating a shape description, defining the appearance of the closed boundary line (S_i) of an object (O_1, O_2, O_3, O_4) in the image.

16. The arrangement of claim 10, 11, 12 or 13, **characterised** in that the transmitter (2, 5, 6) has means for generating a segment description, defining which transform coefficients that belong to respective segment.

17. The arrangement of claim 16, **characterised** in that the transmitter (2, 5, 6) has means for generating a subset description, defining which transform coefficients that belong to an independently decodable part of a segment.

18. The arrangement of claim 14, 15, 16 or 17, **characterised** in that the transmitter (2, 5, 6) has means for generating a pointer, defining a position in the bit stream (27) for the respective one of the above mentioned descriptions.